

CLAIMS

1. A method of removing coatings from portions of generally opposed first and second major surfaces of a substrate, the portions comprising a width and a depth of coatings to be removed, the method comprising:

- 5 providing a table having a table surface for slidable receipt of a substrate;
- providing a first grinding apparatus at a mounting portion of the table;
- providing a second grinding apparatus at the mounting portion of the table,
- opposite the first grinding apparatus;
- moving the substrate relative to the table surface such that the portions of the
- 10 first and second surfaces of the substrate contact the first and second
- grinding apparatuses; and
- removing the coating from the first surface using the first grinding apparatus
- while simultaneously removing coating from the second surface using
- the second grinding apparatus.

- 15 2. The method of claim 1, wherein the step of removing coating from the first surface with the first grinding apparatus while simultaneously removing coating from the second surface with the second grinding apparatus is performed by driving the first grinding apparatus with a first motor and driving the second grinding apparatus with a second motor.

- 20 3. The method of claim 1, further including the step of removing dust produced by the grinding of the first and second surfaces.

4. The method of claim 1, further including the step of adjusting a horizontal extension of the first and second grinding apparatuses to adjust the width of coatings to be removed.

5. The method of claim 1, further including the step of adjusting a vertical position of the first and second grinding apparatuses to adjust the depth of coatings to be removed.

6. The method of claim 5, wherein the step of adjusting the vertical position of the first and second grinding apparatuses is performed while maintaining a horizontal position of the first and second grinding apparatuses.

7. The method of claim 1, wherein the table surface includes plurality of rollers for slidable receipt of the substrate.

8. The method of claim 1, further including the step of positioning the substrate on the table surface.

9. The method of claim 8, wherein the table includes an access recess in which an operator may stand to aid in positioning the substrate on the table surface.

10. An apparatus for removing coatings from portions of first and second surfaces of a substrate, the portions comprising a width and a depth of coatings to be removed, the apparatus comprising:

a support surface configured for slidable receipt of a substrate, the support

surface including a mounting portion;

a first grinding apparatus mounted at the mounting portion of the support

surface; and

a second grinding apparatus mounted at the mounting portion of the support surface, opposite the first grinding apparatus.

11. The apparatus of claim 10, wherein the support surface comprises a table having a table surface.

5 12. The apparatus of claim 11, wherein the table surface includes plurality of rollers for slidable receipt of the substrate.

13. The apparatus of claim 12, wherein the rollers are spaced apart from one another.

10 14. The apparatus of claim 13, wherein the rollers include balls and enclosures for supporting the balls.

15. The apparatus of claim 12, wherein the table has an axis and the rollers are oriented to rotate about an axis that is substantially parallel with the axis of the table.

16. The apparatus of claim 11, wherein the table includes an access recess.

17. The apparatus of claim 16, wherein the table comprises a central section
15 having a first end and a second end, a first end section extending from the first end of the table and a second end section extending from the second end of the table, the first end section and the second end section spaced parallel and apart from one another to form the access recess.

18. The apparatus of claim 11, wherein the table surface includes a plurality of
20 side rollers for supporting a portion of the substrate proximate the first and second grinding apparatuses.

19. The apparatus of claim 18, wherein the side rollers are oriented to rotate about an axis that is substantially normal to the surface of the table.

20. The apparatus of claim 10, further including a first motor to drive the first grinding apparatus and a second motor to drive the second grinding apparatus.

5 21. The apparatus of claim 20, wherein the first motor and the second motor are the same motor.

22. The apparatus of claim 20, wherein the first motor and the second motor are alternating current motors.

23. The apparatus of claim 10, further including a first height adjustment
10 mechanism to control a distance of the first grinding apparatus from the substrate a second height adjustment mechanism to control a distance of the second grinding apparatus from the substrate.

24. The apparatus of claim 23, wherein the first and second height adjustment mechanisms are configured for simultaneous movement of the first and second
15 grinding apparatuses towards or away from one another.

25. The apparatus of claim 23, wherein the first and second height adjustment mechanisms each comprise two guide posts, a threaded shaft being located intermediate the guide posts and being rotatable about a central axis thereof, the first and second grinding apparatuses being operably attached to the threaded shaft such
20 that rotation of the threaded shaft causes the first and second grinding apparatuses to move vertically with respect to the table.

26. The apparatus of claim 23, wherein the first and second height adjustment mechanisms control a distance of the first grinding apparatus from the substrate and a distance of the second grinding apparatus from the substrate while maintaining a horizontal position of the first and second grinding apparatuses.

5 27. The apparatus of claim 10, further including a dust collection system.

28. A method of removing coatings from a substrate, the method comprising:
providing a substrate having generally opposed first and second surfaces, each
surface bearing a functional coating; and
simultaneously removing substantially all of the functional coating from a
10 peripheral region of the first major surface and removing all of the
functional coating from a peripheral region of the second major
surface.

29. The method of claim 28, wherein the step of removing the functional coating from the first and second surfaces of the substrate is performed by grinding.

15 30. The method of claim 28, wherein the step of removing the functional coating is removed from the first surface is performed using a first grinding apparatus, and removing the functional coating from the second surface is performed using a second grinding apparatus.

31. The method of claim 28, further including the steps of positioning the
20 substrate between the first and second grinding apparatuses and simultaneously operating the grinding apparatuses.

32. An apparatus for removing coatings from portions of first and second surfaces of a substrate, the portions comprising a width and a depth of coatings to be removed, the apparatus comprising:

a table having a table surface for slidable receipt of a substrate, the table

5 including a mounting portion and an access recess for an operator;

a first grinding apparatus mounted at the mounting portion of the table;

a second grinding apparatus mounted at the mounting portion of the table,

opposite the first grinding apparatus; and

a first height adjustment mechanism to control a distance of the first grinding

10 apparatus from the substrate and a second height adjustment

mechanism to control a distance of the second grinding apparatus from

the substrate.